**OriGene Technologies, Inc.**
9620 Medical Center Drive, Ste 200
Rockville, MD 20850, US
Phone: +1-888-267-4436
https://www.origene.com
techsupport@origene.com
EU: info-de@origene.com
CN: techsupport@origene.cn

# Product datasheet for SC116499

## AKAP8 (NM_005858) Human Untagged Clone

### Product data:

| | |
|---|---|
| **Product Type:** | Expression Plasmids |
| **Product Name:** | AKAP8 (NM_005858) Human Untagged Clone |
| **Tag:** | Tag Free |
| **Symbol:** | AKAP8 |
| **Synonyms:** | AKAP-8; AKAP-95; AKAP 95; AKAP95 |
| **Mammalian Cell Selection:** | None |
| **Vector:** | pCMV6-XL4 |
| **E. coli Selection:** | Ampicillin (100 ug/mL) |



View online »

**Fully Sequenced ORF:**

>OriGene ORF within SC116499 sequence for NM_005858 edited (data generated by NextGen Sequencing)

ATGGACCAGGGCTACGGAGGCTACGGGGCGTGGAGTGCTGGACCTGCCAACACCCAGGGT
GCATATGGAACTGGTGTGGCCAGCTGGCAAGGTTATGAAAACTACAATTACTATGGCGCC
CAGAACACCAGTGTCACCACAGGCGCAACCTACAGCTACGGCCCAGCCTCGTGGGAGGCC
GCCAAGGCCAATGATGGCGGCCTGGCGGCCGGGGCCCCTGCCATGCACATGGCCTCTTAC
GGCCCAGAGCCATGCACCGACAATTCCGACTCCCTCATTGCCAAGATCAACCAGCGTTTG
GACATGATGTCCAAGGAAGGAGGCAGGGGCGGGAGCGGCGGCGGTGGGGAGGGCATACAG
GACCGGGAGAGCTCCTTCCGCTTCCAGCCGTTCGAGTCCTATGACTCCAGGCCCTGCCTG
CCGGAGCACAACCCCTACCGCCCCAGCTACAGCTACGACTATGAGTTCGACCTGGGGTCC
GACCGCAATGGCAGCTTTGGGGGGCAGTACAGTGAATGCCGAGACCCAGCCCGGGAGCGG
GGCTCCCTTGATGGCTTCATGCGGGGCCGGGGCCAGGGCCGCTTCCAGGACCGGAGCAAC
CCTGGCACCTTCATGCGCAGCGACCCCTTCGTGCCCCCCGCTGCGTCCTCTGAGCCCCTG
TCCACGCCCTGGAACGAGCTGAACTACGTGGGTGGACGGGGCCTGGGAGGGCCCTCCCCC
AGCCGGCCACCTCCGTCCCTCTTCTCCCAGTCCATGGCTCCCGACTACGGCGTGATGGGC
ATGCAGGGGGCGGGCGGCTATGACAGCACCATGCCCTACGGATGTGGCCGCTCGCAGCCT
CGGATGCGGGATCGGGATCGGCCCAAGAGGAGAGGGTTTGACCGCTTCGGACCAGATGGC
ACGGGCAGGAAACGGAAGCAGTTCCAACTTTACGAGGAGCCAGACACCAAACTGGCCCGG
GTTGACAGTGAAGGAGATTTCTCCGAAAATGATGACGCAGCTGGTGACTTCCGCTCAGGA
GATGAAGAATTCAAGGGTGAGGATGAACTCTGCGACTCTGGGAGGCAAAGAGGAGAGAAG
GAGGACGAGGACGAGGATGTGAAGAAGAGAAGGGAAAAGCAAAGGAGAAGAGACAGGACG
CGGGACCGTGCAGCCGACAGAATTCAGTTTGCCTGTTCTGTATGCAAGTTCCGTAGCTTT
GATGACGAAGAGATCCAGAAGCATCTGCAAAGCAAATTTCACAAAGAGACCCTGCGGTTC
ATAAGCACCAAGCTGCCCGACAAGACCGTGGAGTTCCTCCAGGAATACATTGTAAACAGA
AATAAGAAAATTGAGAAGCGGCGTCAGGAATTGATGGAGAAAGAAACCGCAAAACCAAAA
CCAGATCCTTTCAAAGGGATTGGCCAGGAGCACTTCTTCAAGAAGATCGAGGCTGCTCAC
TGCCTGGCCTGCGACATGCTAATTCCTGCACAGCCGCAGCTCCTCCAGCGGCACCTGCAC
TCCGTGGACCACAATCACAACCGCAGGTTGGCTGCTGAACAGTTCAAGAAAACCAGTCTC
CATGTGGCTAAGAGTGTTTTGAACAACAGACATATAGTGAAGATGCTGGAAAAATACCTC
AAGGGTGAGGACCCTTTCACCAGTGAAACTGTTGATCCAGAAATGGAAGGAGATGACAAT
TTAGGAGGTGAGGATAAGAAAGAGACACCTGAGGAGGTGGCCGCGGACGTCTTAGCAGAG
GTGATTACAGCAGCAGTGAGGGCCGTAGATGGGGAAGGAGCGCCCGCTCCAGAGAGCAGC
GGGGAGCCGGCTGAGGACGAAGGCCCCACGGACACAGCGGAGGCCGGTAGTGATCCTCAA
GCCGAACAGCTGCTGGAAGAGCAGGTGCCCTGTGGAACGGCACATGAGAAGGGCGTCCCC
AAGGCCAGAAGTGAGGCTGCAGAGGCTGGAAATGGCGCCGAGACAATGGCAGCAGAGGCA
GAAAGTGCCCAAACCAGAGTTGCTCCTGCCCCAGCTGCCGCGGATGCTGAAGTGGAACAA
ACTGATGCAGAGTCTAAAGACGCTGTTCCCACAGAATGA

Clone variation with respect to NM_005858.3

**5' Read Nucleotide Sequence:**

>OriGene 5' read for NM_005858 unedited
GGGTGCACAATATTTGTATACGACTCACTTATAGGGCGGCCGCGAATTCGCACGAGGTGC
GCTGAACGCATGCGTGCTGTGGTCGCCTAGTAAACGGGGCTGCTGGTGGGCCGCGTCGAA
GACATGGACCAGGGCTACGGAGGCTACGGGGCGTGGAGTGCTGGACCTGCCAACACCCAG
GGTGCATATGGAACTGGTGTGGCCAGCTGGCAAGGTTATGAAAACTACAATTACTATGGC
GCCCAGAACACCAGTGTCACCACAGGCGCAACCTACAGCTACGGCCCAGCCTCGTGGGAG
GCCGCCAAGGCCAATGATGGCGGCCTGGCGGCCGGGGCCCCTGCCATGCACATGGCCTCT
TACGGCCCAGAGCCATGCACCGACAATTCCGACTCCCTCATTGCCAAGATCAACCAGCGT
TTGGACATGATGTCCAAGGAAGGAGGCAGGGGCGGGAGCGGCGGCGGTGGGGAGGGCATA
CAGGACCGGGAGAGCTCCTTCCGCTTCCAGCCGTTCGAGTCCTATGACTCCAGGCCCTGC
CTGCCGGAGCACAACCCCTACCGCCCCAGCTACAGCTACGACTATGAGTTCGACCTGNGG
TCCGACCGCAATGGCAGCTTTGGGGGGCAGTACAGTGAATGCCGAGACCCAGCCCGGGAG
CGGNGCTCCCTTGATGGCTTCATGCGGNGCCGGGGCCAGGGCCGCTTCCCAGACCGGAGC
AACCCTGGCACCTTCATGCGCAGCGACCCCCTTCGTGCCCCCCGCTGCGTCCTCTGAGCC
CCTGTNCACGCCCTGNAACGAGCTGAACTACCGTGGGTGGACGGNGCCCTGGGAGGGCCC
CCCTCCCCGGCCGGCCACCNTCCGTCCCNTCTTCTCCCAGTCCATTGGCTCCCGACTACN
GCGTGATGGGCATGCAGGGGGGCGGCCNCTATGACAGCACATGCCCTACGATGG

**3' Read Nucleotide Sequence:**

>OriGene 3' read for NM_005858 unedited
CTATGAACCCGCGGCCGCAATCTAGAGTCGAGTTTTTTTTTTTTTTTTTTTAAAAAAGG
GGTCTTGCTATGTTGTCCAGGTTGGTCTTGAACTCCTGGGCTTAAGCTATCCTCTCACCA
CGGCCTCCCCAAGTGCTGGGATTATAGGTATGCATCACCGTGCCTGGCCAAATTCTCTTT
GTAAATACATTTGAGTGGTAGTAACTAATTTTAAAGGAAAAAAACCTGAAGTAATCTAGA
GGTGGAACACAAATGAGGTAAAATATTAGAGAACTGATTCAGCAAGGACTAAAGATTGGG
ACGCAATGCCCTCTGCACAGTCTGGTTCTTGAGGTTGCGGTGGGTGTGTTTCCAGTGGCG
TAGGTCGGTCAGATACTTCTGGCCTTTGGGAGTGCGTGGATGTGACGCGGTCAGTGCCAC
ATGTGAACCAGGTGCTGCGAAGTCCTGTGAAAGTCACACACCATATGGTGCACTACAAAG
GTATAGGTTAAAGGCTGAAGCTTGAAACATACAAAAAAAAATCCTCTATAGAGCAAGATA
TATTCCTAGTATTCAGCTGTTCCCAACCAAATAAAAAAAAAAAATTAAGGAAAAAAATAA
AAAAGGAAGCATTCCATCAGTGGCTGTATTGAACAAGTAATGTATCATCAAGATATAATC
ACCCAACCTTTATTATTCCAAGTGCACTACTGTCAAGAGACATGTTACAGCCGCTAGGGA
CAATGTACTCAAGCTTTGAAACCTGGGCAAGAAACCCACGACTGCATGAACAAGCCGTGA
GAGCACTGTTCAGGAGGAAACCTGGCCTCTTCCCCAAATAGATTCAGCTTATTTGGAGCA
CCCCCTTGACTGGTTACAACCACGGAAAAGCACACCCCTTCTTATTCCAAAGCCTTCTGG
GACAGGGATATACAATATTTGTGCCACCCGCTTTCACACCGGCACATTTGTCGCTTAACC
TGCGGGCATTGGGCCGAACACA

**Restriction Sites:** NotI-NotI

**ACCN:** NM_005858

**Insert Size:** 3160 bp

| | |
|---|---|
| **OTI Disclaimer:** | Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at custsupport@origene.com or by calling 301.340.3188 option 3 for pricing and delivery.<br><br>The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. More info |
| **Components:** | The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water). |
| **Reconstitution Method:** | 1. Centrifuge at 5,000xg for 5min.<br>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.<br>3. Close the tube and incubate for 10 minutes at room temperature.<br>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.<br>5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C. |
| **RefSeq:** | NM_005858.2, NP_005849.1 |
| **RefSeq Size:** | 3545 bp |
| **RefSeq ORF:** | 2079 bp |
| **Locus ID:** | 10270 |
| **UniProt ID:** | O43823 |
| **Cytogenetics:** | 19p13.12 |
| **Domains:** | AKAP95 |
| **Protein Families:** | Druggable Genome |
| **Gene Summary:** | This gene encodes a member of the A-kinase anchor protein family. A-kinase anchor proteins are scaffold proteins that contain a binding domain for the RI/RII subunit of protein kinase A (PKA) and recruit PKA and other signaling molecules to specific subcellular locations. This gene encodes a nuclear A-kinase anchor protein that binds to the RII alpha subunit of PKA and may play a role in chromosome condensation during mitosis by targeting PKA and the condensin complex to chromatin. A pseudogene of this gene is located on the short arm of chromosome 9. [provided by RefSeq, May 2011] |